IN THE CLAIMS:

Please AMEND the claims in accordance with the following:

1. (Currently Amended) An optical transmission apparatus with an optical add/drop function used in an optical wavelength multiplex network, comprising:

an optical branching coupler that divides an input wavelength multiplexed optical signal into a wavelength multiplexed optical signal, which is called a passing signal, and another wavelength multiplexed optical signal, which is called a dropping signal;

a plurality of variable wavelength filters that extract a plurality of optical signals from the dropping signal that is branched by the optical branching coupler, each variable wavelength filter is controllable to selectively extract~~ing an~~ different optical signal~~s~~ at ~~a predetermined~~different wavelength~~s~~ from the dropping signal;

a plurality of fixed wavelength lasers that generate a plurality of optical signals to be inserted, each fixed wavelength laser generating an optical signal at one of a plurality of preset wavelengths;

a coupler that bundles the plurality of optical signals generated by the fixed wavelength lasers into a wavelength division multiplexed insertion signal; and

a rejection/add filter that blocks a wavelength division multiplexed optical signal contained in the passing signal that has the same wavelengths as the insertion signal and couples the passing signal with the insertion signal, the wavelengths of the blocked optical signal being the same as the wavelengths of the inserted optical signal.

2. (Canceled)

3. (Currently Amended) An optical transmission apparatus with an optical add/drop function used in an optical wavelength multiplex network, comprising:

an optical branching coupler that divides an input wavelength multiplexed optical signal into a wavelength multiplexed optical signal, which is called a passing signal, and another wavelength multiplexed optical signal, which is called a dropping signal;

a plurality of fixed wavelength filters that extract a plurality of optical signals from the dropping signal that is branched by the optical branching coupler, each fixed wavelength filter extracting an optical signal at a predetermined wavelength from the dropping signal;

a plurality of variable wavelength lasers that generate a plurality of optical signals to be inserted, each variable wavelength laser is selectively controlled to ~~generating~~generate ~~an~~

different optical signals at different wavelengths from the dropping signal~~at one of a plurality of preset wavelengths~~;

a coupler that bundles the plurality of optical signals generated by the variable wavelength lasers into a wavelength division multiplexed insertion signal; and

a rejection/add filter that blocks a wavelength division multiplexed optical signal contained in the passing signal that has the same wavelengths as the insertion signal and couples the passing signal with the insertion signal, the wavelengths of the blocked optical signal being the same as the wavelengths of the inserted optical signal.

4. (Canceled)

5. (Previously Presented) The optical transmission apparatus as claimed in claim 1, wherein

the wavelengths of the insertion signal generated by the fixed wavelength lasers are discriminately preset for the optical transmission apparatus such that the preset wavelengths of the insertion signal for the optical transmission apparatus are arranged to be different from ~~a~~ wavelengths of a corresponding insertion signal for another optical transmission apparatus that is associated with the optical transmission apparatus, and the predetermined wavelengths of the dropping signal extracted by the variable wavelength filters are set for the optical transmission apparatus irrespective of wavelengths of a corresponding signal to be extracted by the other optical transmission apparatus.

6. (Previously Presented) The optical transmission apparatus as claimed in claim 3, wherein

the wavelengths of the insertion signal generated by the variable wavelength lasers are discriminately preset for the optical transmission apparatus such that the preset wavelengths of the insertion signal for the optical transmission apparatus are arranged to be different from wavelengths of a corresponding insertion signal for another optical transmission apparatus that is associated with the optical transmission apparatus, and the predetermined wavelengths of the dropping signal extracted by the fixed wavelength filters are set for the optical transmission apparatus irrespective of wavelengths of a corresponding signal to be extracted by the other optical transmission apparatus.

7. (Previously Presented) The optical transmission apparatus as claimed in claim 1,

wherein the variable wavelength filters are one or more of an AOTF, a dielectric multilayer filter, an FGB type filter, and a Fabry-Perot type filter.

8. (Original) The optical transmission apparatus as claimed in claim 1, further comprising a protection unit that comprises an optical coupler and an optical switch.

9. (Previously Presented) An optical wavelength multiplex network, comprising:

the optical transmission apparatus as claimed in claim 1; and

a double optical loop network that comprises a HUB and two optical loops, wherein the two loops are configured to transmit signals in opposite directions with respect to each other.

10. (Original) The optical wavelength multiplex network as claimed in claim 9, wherein said HUB comprises an optical demultiplexer, an optical coupler, an optical switch, and an optical multiplexer.

11. (Original) The optical wavelength multiplex network as claimed in claim 9, wherein said HUB comprises an optical filter.

12. (Original) The optical wavelength multiplex network as claimed in claim 9, wherein said HUB comprises an optical demultiplexer, a MEMS, and an optical multiplexer.

13. (Original) The optical wavelength multiplex network as claimed in claim 9, wherein said HUB comprises a protection unit that comprises an optical coupler and an optical switch.

14. (Previously Presented) An optical wavelength multiplex network, comprising:

the optical transmission apparatus as claimed in claim 3; and

a double optical loop network that comprises a HUB and two optical loops, wherein the two loops are configured to transmit signals in opposite directions with respect to each other.

15. (Previously Presented) The optical transmission apparatus as claimed in claim 3, further comprising a protection unit that comprises an optical coupler and an optical switch.

16. (Previously Presented) The optical transmission apparatus of claim 1, wherein the optical wavelength multiplex network is one of a loop-like network, a mesh type network, and

a network where a loop-like and mesh type network are intermingled.

17. (Previously Presented) The optical transmission apparatus of claim 1, further comprising:

a supervisory control signal extraction filter that extracts a supervisory control signal from the dropping signal; and

a supervisory control signal insertion filter that inserts a supervisory control signal into the passing signal.